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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/309,412	05/10/1999	KAZUHIRO HARA	450100-4879	7480
20999	7590	01/18/2005	EXAMINER	
FROMMER LAWRENCE & HAUG 745 FIFTH AVENUE- 10TH FL. NEW YORK, NY 10151			JACKSON, JENISE E	
			ART UNIT	PAPER NUMBER
			2131	

DATE MAILED: 01/18/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/309,412

Applicant(s)

HARA, KAZUHIRO

Examiner

Jenise E Jackson

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 01 October 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-19 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

FINAL ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-5, 8-14, 17-19 remain rejected under 35 U.S.C. 103(a) as being unpatentable over Seth-Smith et al. in view of Birdwell et al. (6,172,972).

3. As per claim 1, 11, Seth-Smith et al. discloses a data transmission controlling method for controlling transmission of data from data transmitting means to data receiving means over communication channels(col. 3, lines 14-18, fig. 1, sheet 1), said data transmission controlling method includes, transmitting data encrypted by said data transmitting means to said data receiving means over a first communication channel provided for data transmission from said data transmitting means to said data receiving means(see col. 3, lines 14-22, fig. 1, sheet 1); and transmitting to said data receiving means restrictive data transmission control information for causing the encrypted data to be received solely by specific data receiving means(see col. 6, lines 30-49) at least over a second communication channel which, having a smaller capacity of data transmission than said first communication channel, is also used for data transmission from said data receiving means to said data transmitting means(see col. 6, lines 49-57, fig. 1, sheet 1). Seth-Smith does not disclose whereby the data transmitting means performs a data encapsulation operation on the encrypted data prior to transmitting the encrypted data over the first

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communication channel. The Examiner asserts that Seth-Smith inherently discloses the second communication channel has a smaller capacity, because Seth-Smith discloses one channel can be a landline. Therefore, the teletext information is transmitted in clear text over the landline or satellite (see col. 6, lines 49-52).

4. However, Birdwell et al. discloses whereby the data transmitting means performs a data encapsulation operation on the encrypted data prior to transmitting the encrypted data over the first communication channel(see col. 1, lines 50-60, col. 2, lines 39-66 of Birdwell). It would have been obvious to one of ordinary skill in the art at the time of the invention to include the data transmitting means performs a data encapsulation operation on the encrypted data prior to transmitting the encrypted data over the first communication channel of Birdwell with Seth-Smith, the motivation is that in conventional network data that is typically encapsulated in the packets larger than 127 bytes(see Birdwell, col. 1, lines 61-62). Birdwell discloses that this presents a problem for satellite transmission, because the size of the network packet exceeds the payload size of a satellite packet(see col. 1, lines 62-66). Thus, it is beneficial to use encapsulation, because it can be used over many different types of networks(see col. 2, lines 5-9 of Birdwell).

5. As per claim 2, wherein said second communication channel is a communication channel permitting bi-directional communication between said data transmitting means and said data receiving means, is inherent in Seth-Smith, because Seth-Smith discloses that the user can communicate with the broadcaster(see col. 6, lines 49-67).

6. As per claims 3, 12, wherein said data transmitting means performs data encryption using an encryption key and wherein said encrypted data from said data transmitting means are

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decrypted by said data receiving means utilizing a decryption key identical to said encryption key used in the data encryption(see col. 3, lines 23-27, col. 20, lines 22-34). The Examiner asserts that the keys must be identical in order to decrypt information, that insures that the proper individual receives information; this is disclosed in Seth-Smith et al.

7. As per claims 4, 13, Seth-Smith et al. discloses wherein said encryption key and said decryption key are session keys(i.e. service key) for encrypting and decrypting information and data(see col. 3, lines 14-22, col. 10, lines 38-42, col. 22, lines 9-36, 57-60).

8. As per claims 5, 14, Seth-Smith discloses wherein said session keys(i.e. service keys) are updated at predetermined intervals(see col. 11, lines 66-67, col. 12, lines 1-8, col. 19, lines 33-37).

9. As per claims 8, 17, Seth-Smith discloses said first communication channel is a satellite link permitting unidirectional communication from said data transmitting means to said data receiving means; and wherein said second communication channel is a communication channel permitting bi-directional communication between said data transmitting means and said data receiving means(see col. 6, lines 49-55).

10. As per claims 9-10, 18-19, Seth-Smith inherently discloses wherein said data receiving means is constituted as an IP router, and bridge, because Seth-Smith discloses a subscription television system that uses a satellite to transmit data(see abstract).

11. Claims 6-7, 15-16, are rejected under 35 U.S.C. 103(a) as being unpatentable over Seth-Smith et al. in view of Birdwell and further in view of Mueller.

12. As per claims 6, and 15, Seth-Smith discloses data transmitting means and said data receiving means, and discloses session keys(see above already addressed as per claim 1 and 4).

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13. As per claims 6 and 15, Seth-Smith et al. is silent on a master key that encrypts and decrypts session keys.

14. However, Mueller discloses a master key that encrypts and decrypts session keys(see col. 1, lines 46-61).

15. It would have been obvious to one ordinary skill in the art to combine the teachings of Mueller within the system of Seth-Smith Birdwell combination, because secure session key generation methods, such as Mueller offer distinct advantage that the intercepted, encrypted messages based on the session key cannot be decrypted at a later time even if access to the actual encryption system is gained(see col. 2, lines 1-7 of Mueller).

16. As per claims 7, 16, Seth-Smith discloses said data transmitting means possesses said session keys corresponding to all data receiving means authorized to receive specific information and data; and wherein said data transmitting means transmits in advance said session keys to said data receiving means authorized to receive specific information and data(see col. 21, lines 49-65, col. 22, lines 9-34).

Response To Amendment

17. The Applicant is arguing newly added limitation of “data transmitting means performs data encapsulation operation on the encrypted data prior to transmitting the encrypted data over the first communication channel. Seth-Smith is not relied on for this new limitation. Birdwell was used for this limitation (see above for explanation).

18. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

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A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jenise E Jackson whose telephone number is (571) 272-3791. The examiner can normally be reached on M-Th (6:00 a.m. - 3:30 p.m.) alternate Friday's.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ayaz Sheikh can be reached on (571) 272-3795. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Jenise Jackson

January 13, 2005

E. L. Moise
EMMANUEL L. MOISE
PATENT EXAMINER